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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/892,833	06/27/2001	Kazuchika Sato	15162/03800	3723
24367	7590	06/17/2005	EXAMINER	
SIDLEY AUSTIN BROWN & WOOD LLP			VIEAUX, GARY	
717 NORTH HARWOOD			ART UNIT	
SUITE 3400			PAPER NUMBER	
DALLAS, TX 75201			2612	

DATE MAILED: 06/17/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	Application No.	Applicant(s)	
	09/892,833	SATO ET AL.	
	Examiner	Art Unit	
	Gary C. Vieaux	2612	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 19 January 2005.
- 2a) ☒ This action is FINAL.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 10-15 is/are allowed.
- 6) ☒ Claim(s) 1, 2, 4, 5, 7 and 8 is/are rejected.
- 7) ☒ Claim(s) 3, 6 and 9 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 09 January 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |   |   |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                        | 4) <input type="checkbox"/> Interview Summary (PTO-413)                     |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)    | Paper No(s)/Mail Date. _____  |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date _____   | 6) <input type="checkbox"/> Other: _____                                    |

## DETAILED ACTION

### *Amendment*

5           The Amendment filed on January 19, 2005 has been received and made of record. In response to the first office action, the Specification, the Drawings and Claims 13 and 15 have been amended.

### *Response to Amendments*

10           Figure 7 was amended to correct a spelling error; therefore the objection to Figure 7 is hereby withdrawn.

          Claim 13 was amended to correct improper dependency; therefore the objection to claim 13 is hereby withdrawn.

          Claim 15 was amended to correct a spelling error; therefore the objection to  
15   claim 15 is hereby withdrawn.

          It is also noted that the Specification (§0008, §0009, and §0051) was amended by the Applicant to correct spelling errors not originally pointed out in the Office Action of October 20, 2004.

### *Response to Arguments*

20           Applicants' arguments filed on January 19, 2005, in regards to claims 1, 2, 4, 7, and 8 have been fully considered but they are not persuasive.

Regarding claims 1, 4, and 7, Applicants contend (Remarks p. 11-12) that neither Nishizawa nor Inagaki are found to teach or at least fairly suggest reading out of data in

a non-destructive manner during the main exposure as required by claims 1, 4, and 7, and therefore fails to teach or suggest all the limitations of each claim, respectively.

The Examiner respectfully disagrees.

In support, Applicants cite Nishizawa, at column 6 lines 39-47, "the sensor cell  
5 501 starts storage of the picture signal to be photographed and continues the storing operation until a proper amount of signals is stored. Then the signals thus stored are repeatedly read out by the aforementioned non-destructive readout operation into the visual display unit 201 at the first scanning speed 204, providing an image display on the display 507. The image thus displayed is a monitored image of the photographed  
10 image."

Claims 1, as a representative example, provides for "reading out pixel data of said specified plurality of pixels in a destructive manner before a main exposure and pixel data of said specified plurality of pixels in a nondestructive manner during said main exposure."

15 The language of the claim calls for reading out pixel data in a non-destructive manner during said main exposure. The limitation "during said main exposure", as currently written, is considered broad language and is open to interpretation regarding the breadth and coverage.

Nishizawa provides the reading out of data in a destructive manner before a main  
20 exposure, in which the signals are repeatedly read out to the display unit in a first-step operation of the shutter button (fig. 6, col. 6 lines 23-37.) This is then followed by the reading out of data in a non-destructive manner during the main exposure, in which the

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main exposure is read as occurring at the second-step operation of the shutter button (fig. 6, col. 6 lines 38-39) – a period during which the signals are repeatedly read out non-destructively (fig. 6, col. 6 lines 42-44.) Based on the language of the claims as currently written, Nishizawa is clearly found to provide for the reading out of data during

5 a main exposure in a non-destructive manner.

The Applicants also offer support for this position through the assertion “Nishizawa only teaches reading the photoelectric converter after a store operation, e.g. an exposure is complete” (Remarks p. 11.) However, the language of the claims, as currently written, does not clearly provide for the exclusion or limitation of storage of a  
10 signal “during a main exposure”, and therefore further discussion is rendered moot.

Based on the foregoing, the Examiner stands behind the rejection to claims 1, 4, and 7.

Regarding claims 2, 5, and 8, each depends directly from either independent claim 1, 4, or 7, respectively, and thus, each inherits all the limitations of that claim.

15 Consequently, based on their dependence and the foregoing response to arguments relating to claims 1, 4, and 7, the Examiner respectfully stands behind the rejection.

Applicants’ arguments filed on January 19, 2005, with respect to claims 3, 6, and 9-14 have been fully considered and are persuasive. The rejection of claims 3, 6, and  
20 9-14 has been withdrawn.

From Office Action of October 20, 2004

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

5 (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

10 **Claims 1, 2, 4, 5, 7, and 8** are rejected under 35 U.S.C. 103(a) as being unpatentable over Nishizawa et al. (US #4,475,131) in view of Inagaki et al. (US #6,084,634.)

Regarding claim 1, Nishizawa teaches a digital camera, comprising an image  
15 pick-up element that can read out pixel data in a nondestructive manner (col. 3 lines 17-21) and data read-out means for reading out pixel data in a destructive manner before a main exposure and pixel data in a nondestructive manner during said main exposure (col. 4 lines 25-43.) However, Nishizawa does not teach specifying means for specifying addresses of a plurality of pixels thinned out among all pixels of said image  
20 pick-up element, the plurality of pixels then being employed with the data readout means for reading out pixel data of said specified plurality of pixels in a destructive manner before a main exposure and pixel data of said specified plurality of pixels in a nondestructive manner during said main exposure.

Nevertheless, Inagaki is found to teach specifying means for specifying  
25 addresses of a plurality of pixels, which can be read out in a non-destructive manner, thinned out among all pixels of said image pick-up element (col. 10 line 65 – col. 11 line

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10; col. 11 lines 24-40.) In light of the teaching in Inagaki, it would have been obvious to one of ordinary skill in the art at the time the invention was made to employ the specified plurality of thinned out pixels with the data readout means of the digital camera as taught by Nishizawa. One of ordinary skill in the art at the time the invention  
5 was made would be motivated to combine these teaching in order to obtain smooth motion of images displayed on a display/electronic view finder, while still allowing for capture of the entire image during exposure.

Regarding claim 2, Nishizawa and Inagaki teach all the limitations of claim 2 (see the 103 rejection to claim 1 supra), including teaching a digital camera further  
10 comprising a display which displays a live-view image by using said pixel data read out in said destructive manner before said main exposure and said pixel data read out in said nondestructive manner during said main exposure ('131 col. 6 lines 30-47; '634 col. 11 lines 41-50.)

Regarding claims 4 and 7, although the wording is different, the material is  
15 considered substantively equivalent to claim 1, as discussed above.

Regarding claims 5 and 8, although the wording is different, the material is considered substantively equivalent to claim 2, as discussed above.

***Allowable Subject Matter***

Claims 10-<sup>15</sup>~~14~~ are allowed.

Claims 3, 6, and 9 objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Regarding claims 3, 6, and 9-14, the prior art is not found to teach or fairly suggest, in combination with the existing elements and limitations of the present claims or of claims from which dependence is derived, blur detection which is performed using pixel data read out in a destructive manner before a main exposure and in a nondestructive manner during said main exposure.

***Conclusion***

**THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.



**Contact**

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Gary C. Vieaux whose telephone number is 571-272-7318. The examiner can normally be reached on Monday - Friday, 8:00am - 4:00pm.

5 If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Wendy Garber can be reached on 571-272-7308. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.


Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for  
10 published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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Gary C. Vieaux  
Examiner  
Art Unit 2612

Gcv2

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**AUNG MOE**  
**PRIMARY EXAMINER**